

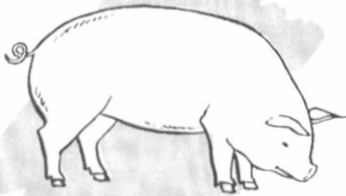
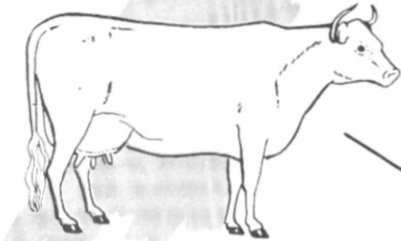
COMMUNICABLE DISEASE CENTER

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SURVEILLANCE



PSITTACOSIS

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U. S. DEPARTMENT OF
HEALTH, EDUCATION, AND WELFARE
PUBLIC HEALTH SERVICE

P R E F A C E

Summarized in this report is information received from Health, Agriculture and Wildlife Officials from the various States and their counterparts in the Federal government. Much of the information is preliminary. It is intended primarily for the use of those with the responsibility of disease control activities. Anyone desiring to quote this report should verify the data at its original source for accuracy and interpretation.

Contributions to the Surveillance Report are most welcome. Please address to:

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I. SUMMARY

During 1964, there were 53 cases of psittacosis in man reported from 20 States.

For the past 8 years, the reported incidence of human psittacosis either declined or remained unchanged. This year, the number of cases decreased from 76 to 53. This trend is probably a result of declining incidence of infection in pet birds, particularly parakeets. However, the principal sources of human psittacosis infection in 1964 were parakeets and pigeons. Poultry outbreaks, such as the turkey epizootics responsible for sizable numbers of human cases in 1954, 1956, 1958, and 1961, did not occur during 1964.

II. INCIDENCE OF HUMAN PSITTACOSIS: 1964 (Tables 1-4; Figures 1 & 2)

The 1964 total of 53 cases is the lowest since 1951. These 53 human psittacosis cases occurred in 19 States, 13 of which reported psittacosis in 1963. During the past 10 years, California, Illinois, Massachusetts, Minnesota, New York, Oregon, and Wisconsin reported psittacosis every year, and Connecticut, Michigan, Ohio, Pennsylvania, and Tennessee every year but one. The reason for this apparent concentration of cases is probably a combination of factors including size of the State's human population, local popularity of pet birds, amount of interest in the psittacosis problem, and number of persons engaged in handling live poultry.

In 1964, the two most common reservoir hosts, parakeets and pigeons, accounted for 75 percent of the 36 cases for which exposure data were furnished. These are the usual sources of infection in nonepidemic years. It is of some interest that since 1961 there has been a continued increase in the number of cases of ornithosis traced to pigeons. This may reflect an increased popularity of pigeon raising as a hobby, a greater awareness of the pigeon as a potential source, or both.

In order that future reporting may be more useful and reliable, it is strongly recommended that laboratory confirmation be sought in all cases diagnosed as psittacosis. This applies to both the human case and its suspected animal source. Paired acute and convalescent sera from human cases should be tested to demonstrate significant changes in titer. A single positive serological reaction cannot usually be considered fully confirmatory. Isolation of the etiologic agent from the patient's blood or sputum can be performed during the acute stage, before the administration of antibiotics; isolation of bedsoniae is, of course, the best confirmation of a suspected case. The suspected bird host may also be tested. Isolation of bedsoniae can be accomplished from blood, feces or organ emulsions. Serology is helpful in most avian species, but is not reliable on specimens from parakeets.

III. CONTROL OF ANIMAL RESERVOIRS

Dissemination of new information concerning the therapy and prophylaxis of avian bedsonial infections (psittacosis and ornithosis) has resulted in increased

application of control measures.

Parakeets. At the present time, it is estimated that 75 percent of domestically-raised parakeets are prophylactically treated with chlortetracycline (CTC) adsorbed to hulled millet seed fed as the only source of feed for at least 15 days. The parakeets are treated immediately prior to placing them in retail stores. This is a procedure recommended by the Public Health Service and by the George Williams Hooper Foundation at the University of California, and voluntarily complied with by the wholesaler.

California produces about 25 percent of all parakeets raised in the United States. In this State, law requires that leg bands be placed on all parakeets raised or sold within the State. The bands have code numbers which designate the aviary in which the bird was hatched. When a human psittacosis case is traced to a parakeet reservoir, all birds on the premises in the aviary and the stores through which the bird was marketed are required to be treated for 30 days with CTC-impregnated millet. This procedure may ultimately eliminate psittacosis from parakeets raised in California. Illinois has a similar regulation, but the number of parakeets bred there is relatively small.

Parrots. Instructions for use of prophylactic CTC in mash feed for parrots have been made available to zoos and other scientific institutions. Many newly imported parrot collections, as well as some imported in the past but never treated with CTC, have undergone the 45 days' treatment recommended for parrots.

Turkeys. Inspection of carcasses in turkey processing plants for lesions suggestive of ornithosis aids in the initial recognition of outbreaks. When an outbreak occurs, control measures include (1) quarantine, (2) supervised medication of the flock followed by slaughter under inspection, and (3) medical surveillance of the human population at risk.

* * * * *

The Communicable Disease Center has prepared a digest of State and Federal laws and regulations governing psittacine birds. Copies may be obtained from the Veterinary Public Health Section, CDC.

TABLE 1
REPORTED PSITTACOSIS CASES

STATE	1955	1956	1957	1958	1959	1960	1961	1962	1963	1964*
Alabama	2	1	1	1	2	-	-	-	-	-
Alaska	-	-	-	-	-	-	-	1	-	-
Arizona	-	1	1	-	-	1	-	1	1	-
Arkansas	2	-	1	-	-	1	-	-	-	1
California	40	56	27	17	17	12	10	10	14	14
Colorado	2	5	4	-	2	1	-	2	-	-
Connecticut	2	5	10	1	7	4	2	6	3	-
Delaware	-	1	-	-	-	-	1	-	-	-
Dist. of Col.	-	-	-	1	-	-	-	-	-	-
Florida	-	-	-	1	-	-	-	-	-	1
Georgia	14	10	11	2	3	-	2	-	3	4
Hawaii	-	-	-	-	-	-	-	-	-	-
Idaho	15	2	4	2	5	-	1	-	-	-
Illinois	40	39	18	7	11	7	7	4	11	6
Indiana	-	5	3	-	-	-	-	1	-	-
Iowa	8	7	5	6	1	-	-	-	-	1
Kansas	2	1	-	1	1	1	-	-	-	-
Kentucky	3	2	-	-	-	2	-	-	1	-
Louisiana	4	2	-	-	-	-	-	-	-	-
Maine	-	3	-	2	5	-	-	-	-	-
Maryland	3	5	5	1	-	-	-	1	-	-
Massachusetts	3	12	5	3	2	2	3	1	2	2
Michigan	1	7	3	5	2	3	2	3	4	3
Minnesota	32	64	36	22	22	4	2	4	1	1
Mississippi	-	4	-	-	1	-	-	-	-	-
Missouri	2	3	1	2	-	-	-	4	-	-
Montana	3	5	2	-	-	-	-	2	1	-
Nebraska	-	-	-	2	-	-	-	-	-	-
Nevada	-	-	-	-	-	-	-	-	-	-
New Hampshire	-	1	-	1	-	-	-	-	-	-
New Jersey	10	2	-	2	-	-	1	1	-	3
New Mexico	2	-	-	1	1	-	-	-	-	-
New York	36	48	24	18	13	9	6	6	5	2
North Carolina	9	75	4	2	-	-	1	3	1	1
North Dakota	3	5	-	-	-	-	-	-	-	-
Ohio	14	13	10	3	1	1	-	1	2	3
Oklahoma	3	-	2	-	-	-	-	-	-	-
Oregon	6	45	15	9	1	3	2	1	2	1
Pennsylvania	15	22	30	9	25	27	6	5	-	2
Rhode Island	1	1	-	-	-	-	-	-	-	-
South Carolina	2	1	1	1	-	-	-	-	-	-
South Dakota	-	-	-	-	-	-	1	-	-	-
Tennessee	3	23	7	4	3	8	6	1	1	2
Texas	13	33	6	2	4	-	23	-	17	1
Utah	1	2	7	1	-	1	3	1	2	-
Vermont	-	-	-	1	-	-	-	-	-	-
Virginia	10	18	10	4	-	-	1	-	-	1
Washington	9	25	5	1	1	2	2	-	-	-
West Virginia	-	-	-	-	-	-	1	-	1	-
Wisconsin	18	14	20	22	17	24	18	20	4	4
Wyoming	-	-	-	1	-	-	1	-	-	-
TOTALS	333	568	278	158	147	113	102	79	76	53

Source: Annual supplements, NOVS and CDC

* Preliminary - weekly reports

TABLE 2
SOURCE OF INFECTION IN 894 HUMAN PSITTACOSIS CASES
UNITED STATES, 1955 - 1964*

YEAR	PARAKEETS	TURKEYS	CHICKENS	DUCKS	PIGEONS	OTHER	TOTAL
1955	129	3	5	—	—	5	142
1956	128	71	20	21	—	10	250
1957	117	1	2	—	8	4	132
1958	52	24	4	—	—	4	84
1959	58	5	7	—	6	5	81
1960	26	1	2	—	3	2	34
1961	33	27	3	—	1	5	69
1962	27	2	2	—	3	4	38
1963	15	—	—	1	9	3	28
1964	17	1	—	—	10	8*	36
TOTAL	602	135	45	22	40	50	894

*Includes 5 unknown

TABLE 3
EXPOSURE CATEGORIES IN 914 HUMAN PSITTACOSIS CASES
UNITED STATES, 1955 - 1964*

YEAR	PET BIRD BREEDER	PET BIRD DEALER	PET BIRD OWNER	POULTRY PROCESSOR	OTHER	TOTAL
1955	6	27	96	6	7	142
1956	9	9	111	96	28	253
1957	8	12	73	—	47	140
1958	1	3	25	21	35	85
1959	3	5	17	4	38	67
1960	—	1	25	1	13	40
1961	1	2	21	27	23	74
1962	2	—	9	3	32	46
1963	—	3	22	—	6	31
1964	5	4	13	—	14	36
TOTAL	35	66	412	158	243	914

*From a TOTAL of 1,910 Cases Reported During This Period.

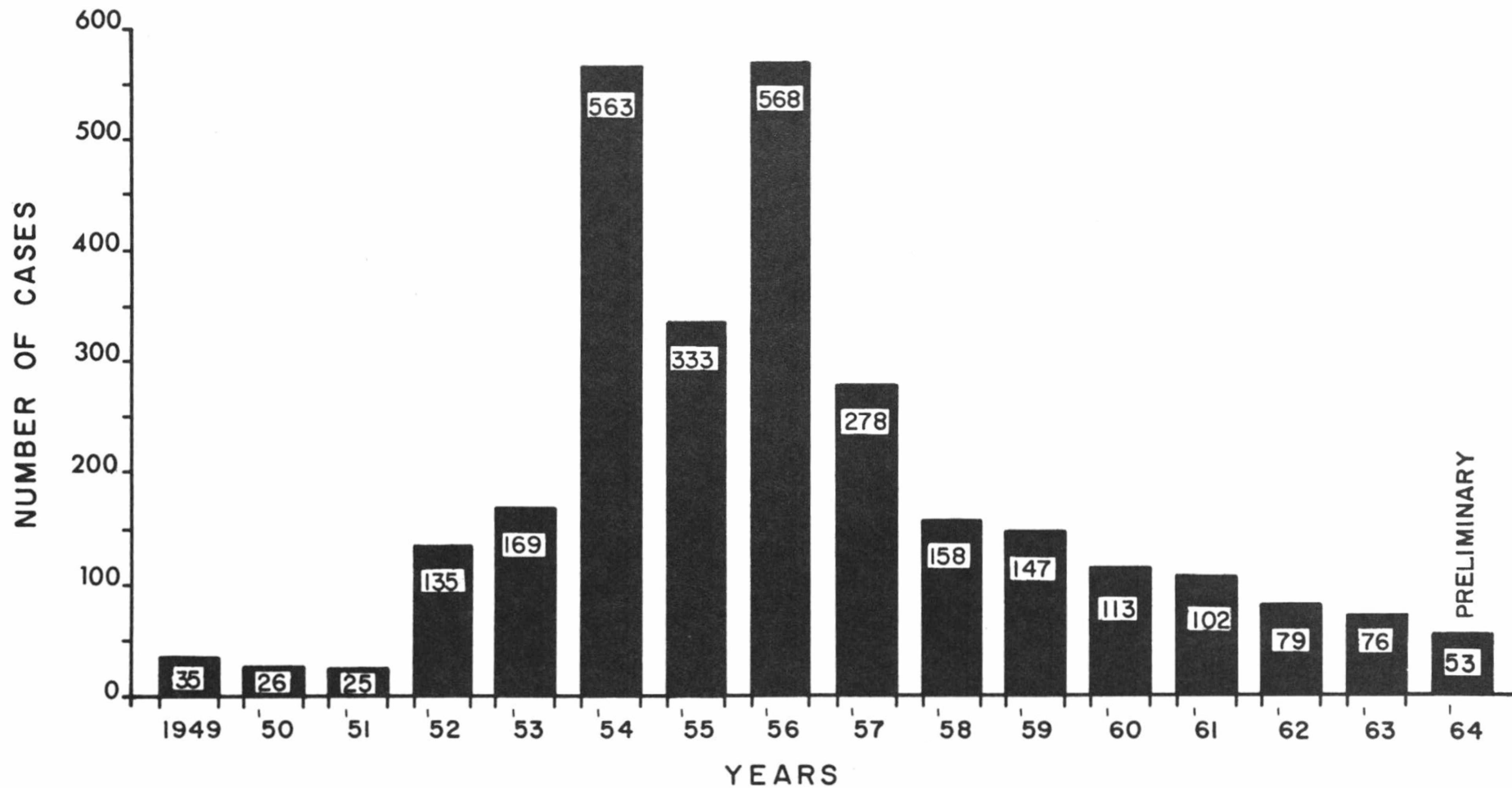
TABLE 4

HUMAN PSITTACOSIS CASES – UNITED STATES 1964
AVAILABLE DATA ON SOURCES OF INFECTION AND EXPOSURE CATEGORIES

EXPOSURE CATEGORIES	SOURCE OF INFECTION								TOTALS
	PARAKEET	OTHER PET BIRDS	CHICKENS	TURKEYS	DOMESTIC PIGEONS	DUCKS	WILD BIRDS	NOT SPECIFIED	
PET BIRD BREEDERS	1				4				5
PET BIRD DEALERS	3							1	4
PET BIRD OWNERS	12							1	13
POULTRY PROCESSORS									
NOT SPECIFIED	1			1	4		4	4	14
TOTALS	17			1	8		4	6	36

SOURCE: Epidemiological reports submitted by States to Communicable Disease Center

Figure 1
REPORTED HUMAN PSITTACOSIS CASES
1949 - 1964



SOURCE: NOVS and MMWR
DHEW/PHS/CDC, ATLANTA, GA.

REVISED OCT. 1965

ALASKA



REPORTED HUMAN

HAWAII



1-4



10-14



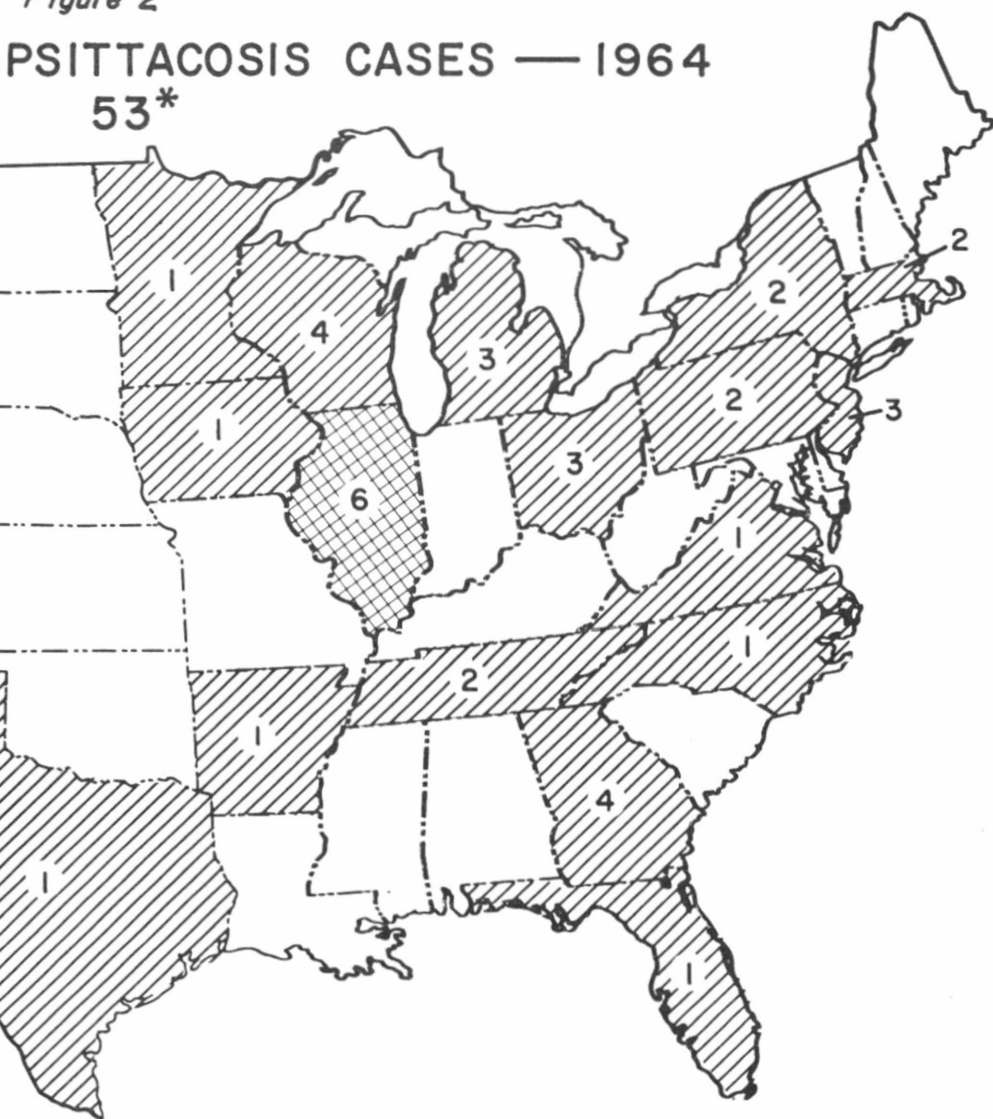
5-9

DREW/PHS/CDC, Atlanta, Georgia

Figure 2

PSITTACOSIS CASES — 1964

53*



*PRELIMINARY DATA

Key to all disease surveillance activities are those in each State who serve the function as State epidemiologists. Responsible for the collection, interpretation and transmission of data and epidemiological information from their individual States, the State epidemiologists perform a most vital role. Their major contributions to the evolution of this report are gratefully acknowledged. In addition, valuable contributions to the Zoonoses Surveillance reports are made by the State Public Health Veterinarians. We are greatly indebted to them for their valuable support.

STATE	STATE EPIDEMIOLOGISTS	STATE PUBLIC HEALTH VETERINARIAN
Alabama	Dr. W. H. Y. Smith	
Alaska	Dr. Thomas R. McGowan	
Arizona	Dr. Philip M. Hotchkiss	*Dr. Philip M. Hotchkiss
Arkansas	Dr. Wm. L. Bunch, Jr.	Dr. Harvie R. Ellis
California	Dr. Philip K. Condit	Dr. Ben Dean
Colorado	Dr. C. S. Mollohan	Dr. Martin D. Baum
Connecticut	Dr. James C. Hart	
Delaware	Dr. Floyd I. Hudson	
District of Columbia	Dr. William E. Long	Dr. George D. Coffee
Florida	Dr. E. Charlton Prather	Dr. James B. Nichols
Georgia	Dr. W. J. Murphy	Dr. John H. Richardson
Hawaii	Dr. W. F. Lyons	Dr. John M. Gooch
Idaho	Dr. John A. Mather	
Illinois	Dr. Norman J. Rose	Dr. Paul R. Schnurrenberger
Indiana	Dr. A. L. Marshall, Jr.	Dr. Dan Schlosser
Iowa	Dr. Ralph H. Heeren	Dr. S. L. Hendricks
Kansas	Dr. Don E. Wilcox	Dr. George A. Mullen
Kentucky	Dr. Russell E. Teague	
Louisiana	Dr. John M. Bruce	Dr. Charles T. Caraway
Maine	Dr. Dean Fisher	
Maryland	Dr. John H. Janney	Dr. Kenneth L. Crawford
Massachusetts	Dr. Nicholas J. Fiumara	Dr. Julian M. Karasoff
Michigan	Dr. George H. Agate	Dr. Donald B. Coohon
Minnesota	Dr. D. S. Fleming	
Mississippi	Dr. Durward L. Blakey	
Missouri	Dr. E. A. Belden	Dr. Edmund R. Price
Montana	Dr. Mary E. Soules	
Nebraska	Dr. E. A. Rogers	
Nevada	Dr. B. A. Winne	
New Hampshire	Dr. William Prince	
New Jersey	Dr. W. J. Dougherty	Dr. Oscar Sussman
New York State	Dr. Julia L. Freitag	Dr. Donald J. Dean
New York City	Dr. Harold T. Fuerst	Dr. Jeroham Asedo
New Mexico	Dr. H. G. Doran, Jr.	*Dr. H. G. Doran, Jr.
North Carolina	Dr. Martin P. Hines	
North Dakota	Mr. Kenneth Mosser	
Ohio	Dr. Calvin B. Spencer	Dr. Jack H. Russell
Oklahoma	Dr. F. R. Hassler	
Oregon	Dr. Grant Skinner	Dr. Monroe Holmes
Pennsylvania	Dr. W. D. Schrack, Jr.	Dr. Ernest J. Witte
Puerto Rico	Dr. Rafael A. Timothee	Dr. Eduardo Toro
Rhode Island	Dr. James E. Bowes	
South Carolina	Dr. G. E. McDaniel	Dr. Frank M. Lee
South Dakota	Dr. G. J. Van Heuvelen	
Tennessee	Dr. C. B. Tucker	Dr. Luther E. Fredrickson
Texas	Dr. Van C. Tipton	Dr. A. B. Rich
Utah	Dr. Elton Newman	
Vermont	Dr. Linus J. Leavens	Dr. D. Pomar
Virginia	Dr. James B. Kenley	Dr. Martin Boyd Marx
Washington	Dr. E. A. Ager	
West Virginia	Dr. L. A. Dickerson	
Wisconsin	Dr. Josef Preizler	Dr. Wayne H. Thompson
Wyoming	Dr. Robert Alberts	

*These are dual assignments.